

10-21-04

AF/2611 # 47
PATENT APPLICATION

ATTORNEY DOCKET NO. 200303806-1

IN THE
UNITED STATES PATENT AND TRADEMARK OFFICE

Inventor(s): Kevin James Brusky et al

Confirmation No.: 5699

Application No.: 08/941174

Examiner: BROWN, Reuben M.

Filing Date: Sep 30, 1997

Group Art Unit:

Title: APPARATUS AND METHOD FOR USING KEYBOARD MACROS TO CONTROL VIEWING CHANNEL

Mail Stop Appeal Brief-Patents
Commissioner For Patents
PO Box 1450
Alexandria, VA 22313-1450

RECEIVED

OCT 26 2004

Technology Center 2600

TRANSMITTAL OF APPEAL BRIEF

Sir:

Transmitted herewith in **triplicate** is the Appeal Brief in this application with respect to the Notice of Appeal filed on 10/19/04.

The fee for filing this Appeal Brief is (37 CFR 1.17(c)) \$330.00.

(complete (a) or (b) as applicable)

The proceedings herein are for a patent application and the provisions of 37 CFR 1.136(a) apply.

() (a) Applicant petitions for an extension of time under 37 CFR 1.136 (fees: 37 CFR 1.17(a)-(d) for the total number of months checked below:

() one month	\$110.00
() two months	\$420.00
() three months	\$950.00
() four months	\$1480.00

() The extension fee has already been filled in this application.

() (b) Applicant believes that no extension of time is required. However, this conditional petition is being made to provide for the possibility that applicant has inadvertently overlooked the need for a petition and fee for extension of time.

Please charge to Deposit Account **08-2025** the sum of \$330.00. At any time during the pendency of this application, please charge any fees required or credit any over payment to Deposit Account 08-2025 pursuant to 37 CFR 1.25. Additionally please charge any fees to Deposit Account 08-2025 under 37 CFR 1.16 through 1.21 inclusive, and any other sections in Title 37 of the Code of Federal Regulations that may regulate fees. A duplicate copy of this sheet is enclosed.

(X) I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in an envelope addressed to:
Commissioner for Patents, Alexandria, VA
22313-1450. Date of Deposit: 10/20/2004

OR

() I hereby certify that this paper is being transmitted to the Patent and Trademark Office facsimile number _____ on _____

Number of pages:

Respectfully submitted,

Kevin James Brusky et al

By

N. Rhys Merrett

Attorney/Agent for Applicant(s)

Reg. No. 27250

Application No. 08/941,174
Group Art Unit 2611
Appeal Brief – October 20, 2004



RECEIVED

OCT 26 2004

Technology Center 2600

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Application No.	08/941,174	Confirmation No.	5699
Filed:	9-30-1997	Examiner:	BROWN, Reuben M.
Inventor(s):	BRUSKY, K. et al.	Group Art Unit:	2611
For:	Apparatus and Method for Using Keyboard Macros to Control Viewing Channel	Attorney Docket No:	200303806-1

Mail Stop Appeal Brief - Patents

Commissioner for Patents
P.O. Box 1450
Alexandria
VA 22313-1450

Express Mail Label
Number EU355969089US

EU 355969089 US

CERTIFICATE UNDER RULE 37 CFR 1.8

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail with sufficient postage in an envelope addressed to: Commissioner of Patents, P.O. Box 1450, Alexandria VA 22313-1450.

October 20,, 2004
Date

N. Rhys Merrett

APPEAL BRIEF

This is an Appeal against the rejection of claims 5, 8-12, and 17-24 in the above identified application, contained in the Office Action mailed July 20, 2004. Appeal from the rejections contained in that Office Action is proper, even though the Office Action was non-Final, because the claims under Appeal have been at least twice rejected (claim 8 having been rejected nine times) – 37 C.F.R. 1.191. This Appeal Brief is submitted in triplicate under 37 CFR 1.192.

During prosecution of this application, responses (including this Appeal Brief) have been made to nine Office Actions over a period of some 5 years. In response to the Office Action mailed November 23, 2003 (citing another new reference), a Notice of Appeal and an Appeal Brief were filed in expectation of expediting prosecution by consideration and a decision by the Board of Appeals. Unfortunately, response was by way of yet a further Office Action which, in

Applicant's view, does not in substance change the grounds of rejection. It is respectfully

10/22/2004 JADD01 00000085 082025 08941174

01 FC:1402 340.00 DA

requested that this Appeal Brief be considered and that the Examiner's response be either a Notice of Allowance or an Examiner's Answer and Reply Brief under 37 CFR 1. 193, so that prosecution of the application is not yet further delayed.

REAL PARTY IN INTEREST.

The real party in interest is the current Assignee, Hewlett-Packard Development Company, L.P., a wholly owned subsidiary of Hewlett-Packard Company with which Compaq Computer Corporation (which owned Compaq Information Technologies Group, L.P., the former assignee of the application) has been merged.

RELATED APPEALS AND INTERFERENCES.

There are no known related appeals or interferences.

STATUS OF CLAIMS.

Claims 5, 8-12 and 17-24 as set forth in the Appendix are currently pending in the application and are subject to this appeal. Claims 1-4, 6, 7, and 13-16 have previously been cancelled.

SUMMARY OF INVENTION.

*Note: For convenience, page and line numbers relating to the specification of this application will be indicated in the format **p:l-m**, p= page number; l, m=line numbers.*

The invention is directed to a personal computer/television (PC/TV) convergence system, i.e. a fully functional computer emulated with the functionality of a television receiver. **1:15-17**. The PC/TV provides a TV mode for viewing television related information (**1:17-2:7**) and a fully functional computer mode (**2:8-2:12**). The PC/TV convergence system is controlled by the computer operating system. The system includes a display monitor to display both TV programs and computer applications either at the same time (in separate windows) or in separate modes (**2:19-23**). Basically, the computer is merged with consumer functionality thereby enabling an average consumer to take advantage of many computing functions, internet access capability, and TV program viewing, in an easy to use consumer oriented product.

The PC/TV system includes a fully functional alpha-numeric computer keyboard, which may be a wireless keyboard 110 (**11:8-10**) operational as a standard computer keyboard when the PC/TV system is operating in a computer mode, and as a TV remote control when the PC/TV system is operating in a TV mode (**11:12-16**). The display may be dedicated to TV viewing in a TV mode or a television window (video window) may be opened while the PC/TV system is operating in a computer mode (**11:17-23**). This permits, for example, a wordprocessor program and a spreadsheet program to be operating simultaneously with an opened television window (**12:8-13**).

The PC/TV convergence system may be operable, e.g. by running a software program, to assist a user when using the keyboard to enter a channel macro associated with a network channel to be selected for display. The channel macro could be a TV station /network abbreviation, e.g. NBC, CBS, ABC, (**11:23-12:7**) identifying the particular station/network from the many channels and networks available from broadcast, cable network, and satellite network sources (**4:6-13**). Channel macros may also be associated with other information sources, e.g. internet network sites and web sites (**19:18-20:23**). Available channel macros may be obtained by the software from a downloaded from a program guide or may be stored in a network database set up by a user (**19:3-17, 20:5-10**).

Selection of a channel is effected with the PC/TV powered on and operating in either a TV mode or in a fully functional computer mode wherein a TV window is open and has focus (**14:22-15:4**). Using the alpha-numeric keys of the computer keyboard (110- Fig 1), as a user enters each letter of text (corresponding to a desired channel name) a list of network channel names is generated having text matching the letter(s) entered by the use and presented by the display to the user (**13:12-23**). The generated list could appear in a list box window or on a channel banner on the display screen as the user is typing (**14:3-5**). The user can select a channel from the generated list or continue typing letters to narrow/shorten the list (**13:23-14:2**). When the network names list is displayed, if a highlighted line in the list can be moved closer to a name that matches the entered keystroke(s), the highlighted name is moved closer to a matching name (**16:5-13; Fig. 2, S212, S214, S208, S210**). A desired channel may be selected by a user by a "select" keystroke (on the computer keyboard) and the PC/TV is

directed to tune to the network corresponding to the currently highlighted line in the displayed list of channel names (**16:14-21**). Alternatively, the "enter" command may be carried out using a pointing device (**16:21-17:1**).

ISSUES.

Whether claims 5, 8-12 and 17-24 are unpatentable under 35 U.S.C. § 103(a) over Gateway 2000 (Press Release, 08/21/1996), in view of U.S. Patent 5,191,423 (Yoshida), in view of U.S. Patent 6,049,796 (Siitonen), and in relation to claims 8, 10, 12, 20 and 24, assertions that features not explicitly disclosed by the references were well known in the art at the time the invention was made.

GROUPING OF CLAIMS.

The claims on Appeal do not stand or fall together. For the purposes of this Appeal only, Claims 5, 8, 9, 10, 12, 17, 18, 19, 20, 21, 22 and 23 may constitute one group (Group I) and claim 24 may constitute a separately patentable group (Group II). Although the claim in Group II is patentable for generally similar reasons as claims in Group I, it is further distinguished by additional recitation in claim 24.

ARGUMENT.

Summary.

Broadly, it will be shown that the grounds of rejection relied on in the Office Action mailed July 20, 2004, fail to satisfy 35 U.S.C. § 103, as particularized by the standards set forth in at least sections 2141-2143 of the MPEP. More particularly, it is Applicants' position (1) the cited references would not have suggested the claimed invention as a whole, i.e. the complete combination of claim elements as recited in each of the rejected claims; (2) the prior art in general and the cited references in particular would not have suggested or provided motivation for combination in the manner alleged in the Office Action; and (3) the Examiner has based rejections of the claims on the impermissible use of "hindsight" based on applicants' disclosure.

Claim Rejections under 35 U.S.C. § 103.

Legal Standards

In rejecting claims under 35 U.S.C. § 103, it is incumbent upon the Examiner to establish a factual basis to support the legal conclusion of obviousness. *See In re Fine*, 837 F.2d 1071, 1073, 5 USPQ2d 1596, 1598 (Fed. Cir. 1988). Obviousness cannot be established by combining the teachings of the prior art to produce the claimed invention absent some teaching or suggestion supporting the combination. *ACS Hospital Systems, Inc. v. Montefiore Hospital*, 732 F.2d 1572, 1577, 221 U.S.P.Q. 929, 933 (Fed. Cir. 1984). Accordingly, to establish a *prima facie* case, the Examiner must not only show that the combination includes all of the claimed elements, but also a convincing line of reason as to why one of ordinary skill in the art would have found the claimed invention to have been obvious in light of the teachings of the references. *Ex parte Clapp*, 227 U.S.P.Q. 972 (B.P.A.I. 1985). When prior art references require a selected combination to render obvious a subsequent invention, there must be some reason for the combination other than the hindsight gained from the invention itself, i.e., something in the prior art as a whole must suggest the desirability, and thus the obviousness, of making the combination. *Uniroyal Inc. v. Rudkin-Wiley Corp.*, 837 F.2d 1044, 5 U.S.P.Q.2d 1434 (Fed. Cir. 1988).

Obviousness cannot be established by combining the teachings of the prior art to produce the claimed invention absent some teaching or suggestion in the prior art supporting the combination. *ACS Hospital Systems, Inc. v. Montefiore Hospital*, 732 F.2d 1572, 1577, 221 U.S.P.Q. 929, 933 (Fed. Cir. 1984). One cannot use hindsight reconstruction to pick and choose among isolated disclosures in the prior art to deprecate the claimed invention. *In re Fine*, 837 F.2d 1071, 5 U.S.P.Q.2d 1596 (Fed. Cir. 1988).

Grounds of Rejection – Group I and Group II Claims

In the Office action mailed July 20, 2004 ("Office Action"), all the claims have been rejected under 35 U.S.C. § 103. In rejecting the independent claims, claims 8, 20 and 24, the Examiner relies primarily on Gateway 2000 in view of Yoshida in view of Siitonen along with general allegation of Official Notice in relation to at least one feature. The Examiner appears to rely on Gateway 2000 as disclosing the following features;

Claim 8:

In a PC/TV computer system having keyboard for providing alphanumeric characters to said PC/TV computer and also having a display monitor, a method of selecting a network station comprising the steps of: storing predetermined network station and internet site names; placing said PC/TV computer in one of a user selectable TV mode and a Computer mode with an active video window;

Claim 20:

A computer system emulating a television system comprising: a merged PC/TV receiver and selectively operable in a user selectable TV mode or computer mode; a monitor connected to said computer system and operable to provide a display in each of said TV and computer modes; and an alphanumeric keyboard for providing alphanumeric information to said computer system,

Claim 24:

In a PC/TV computer system having keyboard for providing alphanumeric characters to said PC/TV computer and also having a display monitor, a method of selecting a network station or an internet site comprising the steps of: storing predetermined network station and internet site identifiers; placing said PC/TV computer in a user selectable TV mode providing a full screen display and no user accessible PC functionality or in a Computer mode providing user accessible PC functionality and with a video window in said display being in focus;

The Examiner relies on Yoshida for teaching "a user controlled station selection device." (Office Action, p.7, second paragraph, first line.) Conceding that "*Yoshida only teaches entering the first alphanumeric key actuation*" (Office Action, paragraph bridging pages 6 and 7) recited in each of independent claims 8, 20 and 24, the Examiner cites Siitonen taking the position Siitonen teaches the functionality associated with actuation of a second alphanumeric key as recited in claims 8, 20 and 24. The Examiner asserts: "*It is taught by Siitonen, that when a user wants to search for a particular item in a database, for the user to enter the first few letters of the names.*" On the basis of these references supplemented by an assertion of "Official Notice" – the Examiner concluded that claims 8, 20 and 24 (together with their dependent claims) are unpatentable under 35 U.S.C. § 103 (a). (As an aside, the Examiner's improper hindsight in attempting to address the conceded deficiencies of Yoshida is apparent from his initial reliance on US Patent 5,629,733 (Youman – Office Action mailed July 5, 2001), subsequently dropped because of rebuttal by Applicant and replaced by reliance on "How to Use Microsoft Windows

NT4, 1996, Ziff-Davis" (Gavron – Office Action mailed September 21, 2003), in turn discarded, in the light of Applicant's rebuttal, in favor of Siitonen (Office Action mailed November 21, 2003). This series of changes will be addressed later in this Appeal Brief.)

Gateway 2000.

While the Gateway 2000 reference may be recognized for what it would have taught a person of ordinary skill in the art, it should be interpreted bearing in mind it is a piece of consumer marketing material and does not have the technical credibility of a technical publication such as, for example, a patent publication or a technical text book. Ambiguities, factually unsupported claims of functional capability and lack of implementation detail in such a reference should be regarded in that light.

In rejecting claim 8 (and also claims 20 and 24), the Examiner relies on Gateway 2000 in the following terms:

"Considering claim 8, Gateway 2000 meets the claimed PCTV computer system having a keyboard for providing alphanumeric characters to the PCTV computer and also a display monitor, pg. 3. Gateway 2000 discloses that the PCTV includes a keyboard and the TV display screen, pg. 4. The PCTV system also enables the user to place the system in one of a PC or TV mode; see pg. 2. The disclosure of the Destination Big Screen PCTV allows for watching TV in a full-size screen mode or as a resizable window in a PC desktop environment, which meets the newly¹ claimed feature of TV mode and a computer mode with an active window.

The claimed feature of storing predetermined Internet site names is met by the disclosure, which teaches on pg. 1, that in the Destination Software Collection, at least Microsoft Works 95 may be pre-installed on the PCTV. The use of Microsoft Works 95 requires at least the Windows 95 operating system, which includes the Microsoft's Internet Explorer is [sic] a web browsing software package and it at least includes the URL, which reads on the claimed storing predetermined Internet site names.

Furthermore, the Destination Software Collection that comes with the PCTV of Gateway 2000, also includes Trials for on-line services and Internet access, which necessarily include web sites addresses, at least of the on-line services;

¹ "newly" - Claim 8 as originally filed in 1997 recited "placing said PC/TV in one of a TV mode and a Computer mode with an active video window;". A similar (but not identical) recitation is included in claim 24 introduced in the response to the Office Action mailed February 19, 2003 and will be discussed in relation to the Group II claim.

see pg. 2. Thus the Gateway 2000 provides at least two ways of storing predetermined Internet site names, and reads on the claimed subject matter.

As for the additionally claimed feature of storing a predetermined station names, the recitation reads on at least temporarily storing an EPG at the PCTV. Gateway 2000 discloses on pg. 3 that a user may choose the option for an on-line TV service. By ordering the on-line TV guide service, the user may scroll through up to two weeks of programming. Even though it is not explicitly disclosed that this on-line TV guide data may be stored at the PCTV, Official Notice is taken that storing EPG data at a consumer network equipment, such as a set-top box was very well known in the art at the time invention was made. It would have been obvious for one of ordinary skill in the art at the time the invention was made, to operate Gateway 2000 in a manner wherein the EPG data is at least temporarily stored at the PCTV, at least in order to speed up the user's access to the EPG data since the data is stored locally instead of being retrieved from the network each time the user desires to view the data.²

Yoshida.

The Examiner states:

" . . . TV tuning systems were well known in the art at the time the invention was made which enabled a user to select a predetermined station by inputting its corresponding station name via alphanumeric keys on a user controlled station selection device."

In support of this contention, the Office action cites Yoshida. But neither Gateway nor Yoshida discloses or suggests

" . . . effecting a first actuation of an alphanumeric key on said keyboard; creating a monitor display of the or each stored network station name or internet site name containing a first character matching the character associated with said alphanumeric key; effecting a second actuation of the same or another alphanumeric key on said keyboard; creating a monitor display of the or each stored network station name or internet site name containing first and second characters matching the characters associated with said first and second alphanumeric key; if necessary, effecting one or more further alphanumeric key

² In continuing these contentions in the first paragraph on page 7 of the Office Action, it is stated:

"Regarding the additional claimed feature of the alphanumeric keyboard containing a key with an associated channel macro for selecting a predetermined network or Internet site name, Gateway 2000 does not explicitly disclose such a feature."

Such a feature is not recited in claim 8 (to the rejection of which page 7 of the Office Action is addressed) but a corresponding feature – set forth in a different recitation – does appear in claim 20.

actuations and creating a monitor display of the or each stored network station name or internet site name containing an initial sequence of characters matching the sequence of characters associated with the sequence of alphanumeric key actuations; effecting user input to the system to mark the or a user selected displayed name having said matching sequence of characters; and then effecting user input to the system to establish communication between the PC/TV computer system and a network station corresponding to the displayed network station name or internet site marked by said user input."

as recited in claim 8, with a similar recitation in claim 24.

Nor does Gateway or Yoshida disclose or suggest:

"... the combination of said computer, said monitor and said alphanumeric keypad providing a user a visual listing of networks by depicting on said monitor successive lists of network names, each list containing network names including an initial sequence of a plurality of characters matching the sequence of characters associated with a sequence of alphanumeric key entry actuations as they are being entered by the user, until the user enters a select input to establish communication with the selected network;"

as set forth in claim 20.

Nor is there suggestion of actuation of a key on the computer system keyboard *"to tune to a network station"* in implementing the above method steps of claim 8 as recited in claim 17; similar comments are applicable to claim 21 in the context of its parent claim 20.

Yoshida teaches at col. 1, line 57 to col. 2, line 2:

"Further, a channel selecting mode in the control means is set to the mode in which a channel is selected by a name of broadcasting station by operating the channel selecting mode setting means. In this mode, the initial letter of the name of the broadcasting station of which a user desires to select is input into the control means by operating a number key or a character key of the input means. Then, all of the names of the broadcasting stations in which the input initial letter is included can be displayed on the display means in order or in a list, and the signal for channel selection is output to the tuner. Accordingly, the user can easily select a desired channel while recognizing the displayed name of the broadcasting station."

Thus, Yoshida explicitly discloses a remote control TV channel selecting transmitter in which only the initial letter of a station name is to be entered by a user. From the resulting displayed

list of station names, "the user can easily select a desired channel", (col. 1 line 68 to col. 2, line 1). This is reinforced by Yoshida at col. 4, lines 11-27 which includes the following teaching:

"The broadcasting station names having the chosen initial letter are displayed in order on the screen so that the user can select the desired channel even when the user does not know the full name or the channel number of the broadcasting station.

The Examiner asserts in the grounds of rejection in the Office Action (page 7, middle paragraph):

"It would have been obvious for one of ordinary skill in the art at the time the invention was made, to modify Gateway 2000 with the known feature of a user inputting an alphanumeric representation of a station in order to select the instant station as shown by Yoshida, at least for the known desirable benefit of avoiding the user memorizing the entire name of a desired TV station, as taught by Yoshida."

The Examiner is silent as to how Gateway 2000 would be modified to accommodate Yoshida's teaching but page 2 of the Office Action ("Response to Arguments") includes the comment:

"[T]he Gateway 2000 disclosure does not limit user interaction with the PCTV to the Field Mouse. Specifically, page 4 of the disclosure states that, 'The keyboard sports an EZ PAD pointing device and a special 'baby-sitter' button that with one click, takes you to the television, emphasis added. Thus the wireless keyboard is a part of the PCTV system, and may be used to at least access the TV service, even though the disclosure only explicitly discusses the Field Mouse operating the TV."

With respect, this discussion by the Examiner is not seen to provide objective evidence, of any suggestion by Gateway 2000 or Yoshida for modification of Gateway to incorporate Yoshida's teaching. The Examiner is merely expressing a speculative, conclusory opinion.

Gateway 2000 discloses on page 4:

"Wireless Keyboard and Field Mouse Remote:

No more cables to tie you down! Both the wireless keyboard (full size!) and Field Mouse remote use radio frequency to transmit data. . . . The Field Mouse remote features consumer buttons that allow for operation of the television just like a conventional remote as well as a large trackball for easy cursor control. The keyboard sports an EZ Pad™ pointing device and a special 'baby sitter' button that with one click, takes you to television.'

Gateway 2000 does state that the keyboard "sports an EZ Pad™ pointing device" but does not discuss how it might be utilized in the context of operation of the television. The "special 'baby sitter' button that with one click, takes you to television" appears to be a separate feature with a specific function not pertinent to the claim features under discussion which are, in the context of the Examiner's reliance on Yoshida, quoting claim 8 by way of example:

"...effecting a first actuation of an alphanumeric key on said keyboard [for providing alphanumeric characters to said PC/TV computer]; creating a monitor display of the or each stored network station name or internet site name containing a first character matching the character associated with said alphanumeric key;

Yoshida teaches a refinement of a conventional remote control transmitter channel selecting device and Gateway 2000 explicitly teaches "The Field Mouse **remote**" (emphasis added) control device "features consumer buttons that allow for operation of the television **just like a conventional remote**" (page 4, emphasis added). While Yoshida may disclose a telephone-type remote control transmitter "keypad" (Yoshida, Fig. 2), it is not a "PC/TV computer system . . . keyboard for providing alphanumeric characters to said PC/TV computer" as recited in claims 8 and 24, nor is it "an alphanumeric keyboard for providing alphanumeric information to said computer system" as recited in claim 20, based on the disclosure at page 11, lines 8-16 of applicant's specification which clearly teaches use of that keyboard "to operate as a TV remote control". In particular, Yoshida's telephone-type keypad 40 does not equate to or suggest operation of a "PC/TV computer system . . . keyboard for providing alphanumeric characters to said PC/TV computer" in relation to "effecting a first alphanumeric key on said keyboard" or "effecting a second actuation of the same or another alphanumeric key on said keyboard" to provide the operational functionality set forth in claim 8 for user selection of a "stored network station name or internet site name". "Consequently, on an interpretation most favorable to the Examiner, Yoshida might hypothetically have suggested modification of the Gateway 2000 Field Mouse remote. While this would have been consistent with the teaching of Gateway 2000, it is **not** what is claimed in any of claims 8, 20 or 24. The Examiner's proposed motivation for combining the teachings is based on speculative assumptions on the part of the Examiner and is not specifically suggested by either Gateway 2000 or by Yoshida.

Siitonen.

The Examiner continues in the Office Action by citing Siitonen for teaching ". . . *that when a user wants to search for a particular item in a database, for the user to enter the first few letters of the names.*" (Office Action, page 7, lines 5-6.)

Siitonen is directed to a personal digital assistant (PDA) incorporating contact information "used to create, edit, delete and manage all information, such as phone numbers and address data. This contact data may be used by the telephone 10b in the telephone, telefax, and E-mail applications. The contact directory, unshown, is a list of all contact cards where each contact card 100 can be created, edited, or deleted." (Col. 5, lines 20-28.) Siitonen discloses: "the contact database 18 contains information . . . constituting business and personal information such as names, addresses, phone numbers, E-mail addresses, and telefax calling numbers." (Col. 4, lines 52-56.) Siitonen also discloses the facility to search the resultant database using a sequential string of letters entered by a user, (col. 2, lines 51-64). Siitonen teaches: "After successfully obtaining a specific name and a corresponding calling number, such as a telephone number, a telefax number, or numbers for an Internet server and/or E-mail address, the numbers are applied to a telephone for establishing a telephone connection." (Col. 2, lines 15-29.)

It can be seen that Siitonen's teaching is directed to a relatively complex system and methodology requiring significant computer data processing capability together with memory adequate to store not only user entered data but also the search engine or search application program resident in the PDA memory – Siitonen, col. 2, lines 30-32, to permit a user to create and update a directory of names and associated telephone numbers, etc, ("generally analogized to a telephone book" – col. 2, line 38) as well as the ability to search the extensive database to locate a "calling number" associated with a name, to initiate and establish a telephone connection. Siitonen's teaching is directed to creation, editing and usage of a relatively complex database coupled with manipulation of the database to establish a telephone connection with a remote location. The environment and context of Siitonen's complex system and methodology requires a significant processing capability and sufficient memory storage for the search engine and data base - Siitonen states: "The personal digital assistant (PDA) is essentially a portable

electronic computer having specialized capabilities.” – Col. 1, lines 17-18. Siitonen’s PDA is very different from the relatively simple remote control transmitter associated with TV channel selection contemplated by Yoshida – note that in Yoshida memory for storing names of broadcasting stations and channel numbers is provided by Yoshida’s microcomputer (col. 2, lines 60-62) – thus, presumably small storage capacity on-board memory.

The Examiner has arbitrarily selected a single, feature from Siitonen (search engine), removed it from the environment of Siitonen and attempted to apply it per se in the very dissimilar, relatively simple environment of Yoshida, (ignoring the attendant processing and memory capabilities that would have been required) without any suggestion or motivation provided by Siitonen or Yoshida. A person of ordinary skill in the art would not have been motivated by Siitonen nor by Yoshida (each considered in its entirety – MPEP 2141.02) to effect modifications as urged by the Examiner. Any such hypothetical modification of Yoshida would have required a more sophisticated processor (rather than Yoshida’s disclosed microcomputer) and memory sufficient to accommodate data and the search engine (application program – Siitonen col. 2, lines 32) that would have changed the principle of operation of Yoshida and taught away from the invention as claimed in any of claims 8, 20 and 24. Consequently, those claims could not have been obvious – MPEP 2143.01. Siitonen may have advantages in the context of his search engine based PDA database environment but there is no suggestion within the applied prior art that the search engine implemented techniques taught by Siitonen would have benefit in the environment of Yoshida’s relatively inexpensive and simple remote control transmitter for channel selection utilizing a microcomputer with a small on-board memory. The Examiner’s proposed motivation is based on an advantage obtained for complex PDA applications and goes against the teachings of Yoshida for implementing a simpler remote control transmitter for channel selection. As previously discussed, Yoshida explicitly teaches a remote control TV channel selecting transmitter in which only the initial letter of a station name is to be entered by a user. From the resulting displayed list of station names, “the user can easily select a desired channel”, (col. 1 line 68 to col. 2, line 1). The Examiner’s proposed motivation for combining the teachings of Yoshida and Siitonen also assumes a benefit which is completely speculative on the part of the Examiner and is not specifically suggested by either of the applied references. In any event, Siitonen does not remedy the deficiencies of Yoshida discussed above and Gateway

2000, Yoshida and Siitonen considered together fail to make obvious the invention as claimed in any of independent claims 8, 20 and 24.

The Examiner's assertion (Office Action, page 8): *"Even though the teachings of Siitonen is applied in an environment of a searching for names or companies in a database, examiner points out that the searching algorithm is entirely applicable to the references of record. This is correct since all of the references are computer controlled, and both Yoshida & Siitonen are concerned with providing lists of items to a user-based upon the user's search request."*, is flawed and a far too sweeping generalization. For example, it has been held that a "Reference was found to be in a different field of endeavor because it involved memory circuits in which modules of varying sizes may be added or replaced, whereas the claimed invention involved compact modular memories." *Wang Laboratories, Inc. v. Toshiba Corp.*, 993 F. 2d 858, 26 USPQ2d 1767 (Fed. Cir. 1993) – cited at MPEP 2141.01(a). In the grounds of rejection in the Office Action, the Examiner is attempting to assert analogy between the Gateway 2000 "Destination Big Screen PC" (employing a 31-inch viewable area monitor), a relatively simple television receiver remote control channel transmitter (Yoshida), and a PDA incorporating an extensive, complex, user created, database containing names and corresponding telephone (or other communication) numbers used by the PDA search engine (application program) in establishing telephone and other network connections (Siitonen). With respect, these are not analogous prior art references as between themselves nor with respect to the invention set forth in any of claim 8, 20 and 24.

In relation to claim 20 (Office Action, page 9), the Examiner asserts: *As for the additionally claimed feature of channel macros operably associated predetermined TV networks, the feature reads on each letter being input in Yoshida, which generates a different list of broadcast stations.* "The pertinent feature of claim 20 is recited as: "said computer system being capable of interpreting different predetermined alphanumeric key actuations on said alphanumeric keyboard as respective channel macros associated with network channels" (emphasis added). Thus, the claim language requires that each of the recited "predetermined alphanumeric key actuations" is associated with an individual network channel. This, by the Examiner's own characterization is not what is disclosed or suggested by Yoshida in which a letter input by the

keypad results in display of a list of all broadcast stations having that initial letter. This ground of rejection of claim 20 is therefore improper and should be reversed.

The above discussion has demonstrated that Gateway 2000 and Yoshida and Siitonen fail to suggest the desirability of the invention as recited in any of claims 8, 20 and 24 (MPEP 2143.01) and beyond that, those references would together have failed to provide all of the claimed elements as set forth in any of claims 8, 20 and 24. Consequently, the Examiner has failed to establish a *prima facie* case of obviousness of the claimed invention, (MPEP 2143.03). For these reasons, the rejection in the Office action mailed July 20, 2004 of the pending claims should be reversed and this Appeal should be allowed.

Improper "Hindsight" Analysis.

As apparent from the above discussion relating to Siitonen, the Examiner has cherry picked that reference arbitrarily to isolate a single feature (the search engine) from a complex set of interrelated features with no suggestion in Siitonen or Yoshida of desirability of employment of that feature in the context of Yoshida's relatively simple, straightforward remote channel selector transmitter. Indeed, Yoshida is emphatic that his teaching of display of station names having an initial letter corresponding to that selected by a user is adequate to meet the needs of the situation he addressed, i.e. "The broadcasting station names having the chosen initial letter are displayed in order on the screen so that the user can select the desired channel even when the user does not know the full name or the channel number of the broadcasting station." (Col. 4, lines 6-10.)

Nor does Gateway 2000 provide any such motivation. As discussed earlier in this Appeal Brief, Gateway 2000 merely confirms the use of a remote control device ("Field Mouse") for TV channel selection and provides no motivation for a person of ordinary skill in the art to have proceeded further. Gateway 2000 explicitly teaches use of the "Field Mouse" remote that "features consumer buttons that allow for operation of the television **just like a conventional remote**" (page 4, emphasis added) Applicants' invention recognized the advantages in a PC/TV convergence environment of utilizing the computer system keyboard both for computer operations as well as a "TV remote control" (specification, page 11, lines 8-16), teaching use of

the computer keyboard to effect TV station name entry and identification, using search capability refinement based on search updating as a sequence of letters are entered by a user (specification, page 13, lines 12-23). The overall combination of claim features set forth in claims 8, 20 and 24, resulting in these advantages, would not have been suggested or motivated by Gateway 2000, Yoshida or Siitonen and it is the teaching of Applicants' claimed invention that has prompted the Examiner in selection of the Siitonen reference. It is recognized, as the Examiner has pointed out in the Office Action, that a reconstruction based on hindsight is in a sense necessarily a reconstruction based upon hindsight reasoning, but the mere existence of individual claim features in the prior art is simply an inadequate basis for concluding a claim is obvious over the prior art. There must be motivation clearly attributable to the prior art to combine features in the manner required by claim recitations. The grounds of rejection in the Office Action fail in this regard and this is an additional reason the grounds of rejection of claims 8, 20 and 24 contained in the Office Action are untenable, should be reversed, and the Appeal allowed.

This conclusion is buttressed by established case law. Attention is drawn to criteria set forth by the CAFC in *In re Kotzab* 55 USPQ2d 1313 (CA FC 2000), quoted in pertinent part:

"A critical step in analyzing the patentability of claims pursuant to section 103(a) is casting the mind back to the time of invention, to consider the thinking of one of ordinary skill in the art, guided only by the prior art references and the then-accepted wisdom in the field. See *Dembiczak*, 50 USPQ2D at 1617. Close adherence to this methodology is especially important in cases where the very ease with which the invention can be understood may prompt one "to fall victim to the insidious effect of a hindsight syndrome wherein that which only the invention taught is used against its teacher." *Id.* (quoting *W.L. Gore & Assocs., Inc. v. Garlock, Inc.*, 220 U.S.P.Q. 303, 313 (Fed. Cir. 1983)).

"Most if not all inventions arise from a combination of old elements. See *In re Rouffet*, 47 USPQ2D 1453, 1457 (Fed. Cir. 1998). Thus, every element of a claimed invention may often be found in the prior art. However, identification in the prior art of each individual part claimed is insufficient to defeat patentability of the whole claimed invention. Rather, to establish obviousness based on a combination of the elements disclosed in the prior art, there must be some motivation, suggestion or teaching of the desirability of making the specific combination that was made by the applicant. See *In re Dance*, 48 USPQ2D 1635, 1637 (Fed. Cir. 1998); *In re Gordon*, 221 U.S.P.Q. 1125, 1127 (Fed. Cir. 1984)."

It is error to attempt such reconstruction using applicant's claim as a blueprint; *W.L. Gore & Associates, Inc. v. Garlock, Inc.*, 220 USPQ 303 (CAFC 1985). The mere fact that the prior art could be modified to form the invention as defined in any of the rejected claims does not make the modification obvious unless the prior art would have suggested the desirability of the modification - see *In re Laskowski*, 10 USPQ2d 1297 (CAFC 1989).

The repeated admissions, in successive Office Actions, by the Examiner that Yoshida is deficient in its teachings relating to the invention claimed in claim 8 (and consequently in relation to claims 20 and 24), and the Examiner's repeated attempts to remedy the deficiencies exposed by Applicant, by citing first one reference (Youman), and then another (Gavron), and then another (Siitonen), all prompted by Applicant's discussion of the invention in relation to the references, evidences a mindset of impermissible *ex post facto* analysis by the Examiner. The Examiner has repeatedly attempted to retrofit disparate references together, guided by the teaching provided by Applicant's claimed invention, to provide a collocation of features that have then been alleged, on the basis of speculation by the Examiner, to teach the particularized combination of elements recited in each of those claims. Not only is that claim rejection methodology impermissible, it has still failed to arrive at the complete set of limitations as set forth in each of claims 8, 20 and 24, as discussed in detail above.

In summary, it is respectfully urged that the above discussion demonstrates the grounds of rejection of claims 8, 20 and 24 and of their dependent claims set forth in the Office Action should be reversed and this Appeal allowed.

Grounds of Rejection – Group II:

The above arguments as applied to the rejection of claims 8, 20, 24 are supplemented as follows in relation to Group II claim 24, to which the Examiner applied the same grounds of rejection as used in relation to claim 8. However claim 20 includes the additional recitation:

"placing said PC/TV computer in a user selectable TV mode providing a full screen display and no user accessible PC functionality or in a Computer mode providing user accessible PC functionality and with a video window in said display being in focus;"

In the Office Action, the Examiner asserts in relation to Gateway 2000: *"The PCTV system also enables the user to place the system in one of a PC or TV mode; see pg. 2. The disclosure of the Destination Big Screen PCTV allows for watching TV in a full-size screen mode or as a resizable window in a PC desktop environment, which meets the newly³ claimed feature of TV mode and a computer mode with an active window."* (Office Action, page 5, Section 3, lines 7-10 discussing the rejection of claim 8.) The actual disclosure in the passage of Gateway 2000 cited by the Examiner is: *"The Harman Interactive Smart TV Software is the perfect tool for controlling television capabilities on the Destination Big Screen PC. It allows you to watch TV either full-screen or in a re-sizeable window that can be moved around the desktop."* This does not correspond to the quoted feature as recited in claim 24 and, particularly noting the previous observation that Gateway 2000 is consumer marketing material, the technical accuracy of which may be imprecise, the Examiner's assertion is speculative and not a tenable basis for rejection of claim 24.

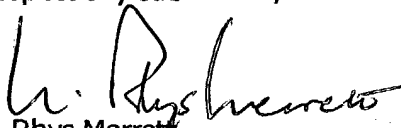
Claim 24 thus is additionally distinguished from Gateway 2000 providing a further reason the rejection of claim 24 in the Office Action should be reversed and the Appeal allowed.

CONCLUSION.

It has been shown that the grounds of rejection relied on in the rejection of claims under 35 U.S.C. § 103 in the Office Action mailed July 20, 2004 lack merit. None of the claims on Appeal is rendered unpatentable under 35 U.S.C. § 103 by the cited references and all the claims on appeal are patentable. Accordingly, reversal of all outstanding grounds of rejection and early allowance of this Appeal and of the application are respectfully requested.

Date: October 20, 2004
HEWLETT-PACKARD COMPANY
Intellectual Property Administration
3404 E. Harmony Road
Mail Stop 35
Fort Collins, CO 80528-9599

Respectfully submitted,


N. Rhys Merrett
Attorney for Applicant
Reg. No. 27,250

³ See footnote 1



APPEAL BRIEF

APPENDIX

RECEIVED
OCT 26 2004
Technology Center 2600

CLAIMS 5, 8-12, 17-24 ON APPEAL

Canceled: Claims 1-4, 6 and 7, 13-16,

5. The method of claim 8, wherein said keyboard is a wireless keyboard.

8. In a PC/TV computer system having keyboard for providing alphanumeric characters to said PC/TV computer and also having a display monitor, a method of selecting a network station comprising the steps of:

storing predetermined network station and internet site names;

placing said PC/TV computer in one of a user selectable TV mode and a Computer mode with an active video window;

effecting a first actuation of an alphanumeric key on said keyboard;

creating a monitor display of the or each stored network station name or internet site name containing a first character matching the character associated with said alphanumeric key;

effecting a second actuation of the same or another alphanumeric key on said keyboard;

creating a monitor display of the or each stored network station name or internet site name containing first and second characters matching the characters associated with said first and second alphanumeric key;

if necessary, effecting one or more further alphanumeric key actuations and creating a monitor display of the or each stored network station name or internet site name containing an initial sequence of characters matching the sequence of characters associated with the sequence of alphanumeric key actuations;

effecting user input to the system to mark the or a user selected displayed name having said matching sequence of characters; and

then effecting user input to the system to establish communication between the PC/TV computer system and a network station corresponding to the displayed network station name or internet site marked by said user input.

9. The method of claim 8, further comprising a step of downloading a program guide from a network provider, said program guide providing information that matches network stations with TV channels.

10. The method of claim 8, wherein the or a user selected displayed network station name containing a matching first character is highlighted.

11. The method of claim 8, wherein said monitor display is effected in an active window of said display monitor when the system is in said Computer mode.

12. The method of claim 8, wherein the step of displaying is performed by providing a channel banner on the display monitor.

17. The method of claim 8, wherein said user input to tune to a network station is effected by actuation of a key on said keyboard.

18. The method of claim 8, wherein said user input to tune to a network station is effected by user operation of a pointing device.

19. The method of claim 8, wherein in said TV mode said PC/TV has a full screen display and no user accessible PC functionality and in said Computer mode said PC/TV has user accessible PC functionality and a video window in said display.

20. A computer system emulating a television system comprising:
a merged PC/TV receiver and selectively operable in a user selectable TV mode or computer mode;
a monitor connected to said computer system and operable to provide a display in each of said TV and computer modes; and

an alphanumeric keyboard for providing alphanumeric information to said computer system, said computer system being capable of interpreting different predetermined alphanumeric key actuations on said alphanumeric keyboard as respective channel macros associated with network channels, the combination of said computer, said monitor and said alphanumeric keypad providing a user a visual listing of networks by depicting on said monitor successive lists of network names, each list containing network names including an initial sequence of a plurality of characters matching the sequence of characters associated with a sequence of alphanumeric key entry actuations as they are being entered by the user, until the user enters a select input to establish communication with the selected network;

wherein some of said channel macros are operably associated with predetermined TV networks; and wherein at least one other channel macro is operably associated with an internet network site.

21. The computer system of claim 20, wherein said user input to tune to a network is effected by actuation of a key on said keyboard.

22. The computer system of claim 20, including a pointing device operable to effect said user input to tune to a network.

23. The computer system of claim 20, wherein in said TV mode said PC/TV receiver monitor has a full screen display and no user accessible PC functionality and in said computer mode said PC/TV receiver has user accessible PC functionality and a video window in said monitor display.

24. In a PC/TV computer system having keyboard for providing alphanumeric characters to said PC/TV computer and also having a display monitor, a method of selecting a network station or an internet site comprising the steps of:

storing predetermined network station and internet site identifiers;

placing said PC/TV computer in a user selectable TV mode providing a full screen display and no user accessible PC functionality or in a Computer mode providing user accessible PC functionality and with a video window in said display being in focus;

effecting a first actuation of an alphanumeric key on said keyboard associated with a

network identifier;

creating a monitor display of the or each stored network station identifier or internet site identifier having a first character matching the character associated with said alphanumeric key;

effecting a second actuation of the same or another alphanumeric key on said keyboard;

creating a monitor display of the or each stored network station identifier or internet site identifier containing first and second characters matching the characters associated with said first and second alphanumeric key;

if more than one said identifier is displayed, optionally effecting one or more further alphanumeric key actuations and creating a monitor display of the or each stored network station identifier or internet site identifier containing an initial sequence of characters matching the sequence of characters associated with the sequence of alphanumeric key actuations;

effecting user input to the system to mark the or a user selected displayed name having said matching sequence of characters; and

then effecting user input to the system to establish communication between the PC/TV computer system and a network station corresponding to the displayed network station identifier or internet site identifier marked by said user input.